

Formula for Gravid Trap Bait Infusion for *Culex* Mosquitoes

Materials and Ingredients:

- 1 One each, 40 gallon plastic trash can with a tight fitting snap-on lid (Rubbermaid or other brand).
- 2 30 gallons of water
- 3 About 1 lb of dry straw or hay.
- 4 About 1 lb of freshly mowed grass clippings.
- 5 Five grams of brewers yeast.

Mixing Directions

(1) Place the plastic trash can in a location where it will get direct sunlight for at least several hours per day; make sure the trash can is not located in a place where odor from the finished bait will offend anyone. (2) Fill the plastic trash-can with 30 gallons of water. (3) Mix the dry straw or hay with the fresh grass clippings, and stir 2 pounds of this grass/straw mixture into the 30 gallons of water. (4) Add 5 grams of brewers yeast and stir it into the grass/straw/water mixture. (5) Place lid on the trash-can and let the mixture brew for five days; stir the mixture once every day.

Bait Usage Directions

After a period of about five days the bait will be ready to use. **Note:** This particular brew will have a foul odor (somewhat similar to that of raw sewage), but will be highly attractive to *Culex pipiens* and *Cx. restuans*. If you use this bait and do not catch either of the above-mentioned *Culex* species, there probably were not any active in the area where the gravid trap was set. Be careful not to leave the lid off of the trash-can because the odor of this bait may offend neighbors, and may attract swarms of egg laying *Culex pipiens* every night.

It is convenient to pour the finished bait into a 2.5 gallon, wide-mouth, container to carry it to your trap sites (an empty 2.5 gallon, plastic cat litter container works well for this purpose). After use, the bait can either be dumped, or it can be poured back into the carrying container for repeated use. If the bait is to be reused repeatedly, add several granules of Altosid™ larvicide to the bait to prevent the development of mosquitoes from eggs that have been laid in it.

When this particular bait is freshly made, it is **not** attractive to *Aedes albopictus* or the *Ochlerotatus* species of container breeding mosquitoes. However, after about three weeks of usage, this bait starts to become slightly less attractive to *Culex pipiens* or *Cx. restuans*, and becomes more attractive to the *Aedes albopictus* and the *Ochlerotatus* species that breed in containers. If collection of *Cx. pipiens* and *Cx. restuans* is your primary goal, you should start a fresh batch of bait every month. You can keep the older bait and use it when trapping specifically for the container breeding *Aedes* and *Ochlerotatus* species.

Easy Method of Grass/Straw/Hay Ingredient Preparation and Storage

Obtain a trash bag full of straw or hay sweepings from your local farm store. Spread the material uniformly on a lawn that needs to be mowed. Mow lawn with a grass catch bag on the mower (the mowing action will chop up the straw/hay and mix it with green grass clippings. Measure out two-pound allotments of this grass/straw/hay mixture and pack each allotment into large Ziploc bags. Freeze the bags for future use (freezing will prevent the grass/straw mixture from decomposing) and pull them out of the freezer whenever you need to make a batch of bait. If you have access to a large freezer space, the method detailed above will allow you to prepare a full season's worth of ingredients for making bait.